

AMENDMENTS TO THE CLAIMS

Please **AMEND** claims 7 and 15

A copy of all pending claims and a status of the claims is provided below.

1. (previously presented) A method for evaluating a material body by a scattered light observation system which observes a gel state or a gel-formable sol state material body illuminated with a coherent light through a two dimensional image recognizing means, comprising measuring a gel state or a change in sol-gel state of said material body using a light section formed on an image forming surface or conditions of a speckle pattern.

2. (previously presented) The method for evaluating a material body according to claim 1, wherein the material body is a gel shape food article or a gel-formable sol shape food article, and its quality and change in quality are evaluated.

3. (previously presented) The method for evaluating a material body according to claim 1, wherein a member having at least a part through which irradiated light can permeate is intervened between the material body and the two-dimensional image recognizing means.

4. (previously presented) The method for evaluating a material body according to claim 1, wherein wavelength of irradiation light is within the range of from visible light to near infrared.

5. (previously presented) The method for evaluating a material body according to claim 2, wherein a released state of water existing in a sealed and packaged product of the material body is detected.

6. (previously presented) The method for evaluating a material body according to claim 1, wherein the material body is put in a dynamic state.

7. (currently amended) A device for carrying out a material body evaluation method, comprising:

a light irradiation device which irradiates a light having at least one spot shape or line shape section in a first direction onto a material body;

a light irradiation photographing device comprising at least one of two-dimensional image recognizing means;

a moving device for moving at least one of (i) the light irradiating device and the two dimensional image recognizing means and (ii) the material body in a direction transverse to the first direction, for carrying out scanning measurement of almost full face or full face of the material body which can be observed in a photographing direction of the two-dimensional image recognizing means.

8. (previously presented) The device of claim 7, wherein the two-dimensional image recognizing means measures a speckle pattern.

9. (previously presented) A measuring system, comprising:

a coherent light source for emitting a coherent light onto a material; and
an image recognizing device structured and arranged to measure a gel state or change in sol-gel state of the material by receiving a speckle pattern of the coherent light from the material.

10. (previously presented) The measuring system of claim 9, wherein the coherent light source comprises one of: a laser, a mercury arc lamp, a white light source, an incandescent light, a sodium lamp, an infrared light source, and an ultraviolet light.

11. (previously presented) The measuring system of claim 9, wherein the coherent light is in the shape of a line or an assembly of points.

12. (previously presented) The measuring system of claim 9, wherein the image recognizing device comprises one of: a CCD camera, a MOS camera, a TV camera, a video camera, an image tube, an image intensifier, and a digital camera.

13. (previously presented) The measuring system of claim 9, further comprising a predetermined relational expression of speckle values and gel state or change in sol-gel state values.

14. (previously presented) The measuring system of claim 9, further comprising:
a container that holds the material; and
an inspection hole disposed in the container,
wherein the coherent light is emitted into the inspection hole.

15. (currently amended) The measuring system of claim 14, further comprising an ~~agitator~~ a vibrator that ~~mixes~~ shakes the material in the container.

16. (previously presented) The measuring system of claim 14, wherein the container comprises a pipe.

17. (previously presented) The measuring system of claim 9, further comprising:
a first optical fiber connected to the coherent light source; and
a second optical fiber connected to the image recognizing device.

18. (previously presented) The measuring system of claim 9, further comprising a moving device that moves the material past the coherent light source and the image recognizing device.

19. (previously presented) The measuring system of claim 9, further comprising:
a first lens disposed between the coherent light source and the material; and
a second lens disposed between the image recognizing device and the material.

20. (previously presented) The measuring system of claim 9, wherein the material comprises one of: agar gel, gelatin gel, tofu, konnyaku jelly, collagen gel, silicone gel, silica gel, resin, natural rubber, synthetic rubber, lacquer, paint, milk, soybean milk, bean curd, custard, pudding, and raw egg liquid.